

Claims

1. A method of communicating in a wireless telecommunications system including a subscriber terminal and an infrastructure, the method comprising:

connecting the subscriber terminal to the infrastructure over a wireless interface, the subscriber terminal holding a subscriber identity in the wireless telecommunications system;

connecting the subscriber terminal to at least one sub-terminal over a proximity wireless interface, the at least one sub-terminal using the subscriber identity of the subscriber terminal;

requesting a radio link from the subscriber terminal, the radio link being directed from the infrastructure to the at least one sub-terminal;

generating signalling parameters for controlling the radio link; and

communicating at least one of the signalling parameters between the sub-terminal and the infrastructure via the subscriber terminal.

2. The method of claim 1, further comprising generating at least some of the signalling parameters in the sub-terminal.

3. The method of claim 1, further comprising communicating at least some of the signalling parameters between the sub-terminal and the infrastructure over a wireless interface between the infrastructure and the sub-terminal.

4. The method of claim 1, further comprising configuring the sub-terminal to provide the radio link according to at least some of the signalling parameters.

5. The method of claim 1, further comprising:

generating, in the infrastructure, proximity signalling parameters for controlling the proximity wireless interface;

communicating the proximity signalling parameters between the subscriber terminal and the infrastructure;

communicating at least some of the proximity signalling parameters between the subscriber terminal and the sub-terminal; and

configuring the proximity wireless interface according to the proximity signalling parameters.

6. A terminal system of a wireless telecommunications system, the terminal system comprising an infrastructure and a subscriber terminal, the subscriber terminal comprising:

connecting means for connecting the subscriber terminal to the infrastructure;

subscriber identity means for holding a subscriber identity of the subscriber terminal in the wireless telecommunications system;

at least one sub-terminal using the subscriber identity of the subscriber terminal and including receiving means for providing a radio link directed from the infrastructure to the at least one sub-terminal, the radio link being controlled on the basis of signalling parameters;

requesting means, in the subscriber terminal, connected to the connecting means, for requesting the radio link;

signalling means connected to the connecting means, for communicating at least one of the signalling parameters between the subscriber terminal and the infrastructure; and

proximity signalling means connected to the signalling means, for communicating the at least one of the signalling parameters between the subscriber terminal and the at least one sub-terminal over a proximity wireless interface.

7. The terminal system of claim 6, wherein the sub-terminal further comprises generating means connected to the proximity signalling means, for generating at least some of the signalling parameters.

8. The terminal system of claim 6, wherein the sub-terminal further comprises sub-terminal signalling means connected to the receiving means, for communicating at least some of the signalling parameters between the sub-terminal and the infrastructure over a wireless interface.

9. The terminal system of claim 6, wherein the sub-terminal further comprises receiver configuring means connected to the receiving means and the proximity signalling means, for configuring the receiving means according to at least some of the signalling parameters.

10. The terminal system of claim 6, further comprising:
second signalling means connected to the proximity signalling means and the connecting means, for communicating proximity signalling parameters between the subscriber terminal and the infrastructure, the proximity signalling parameters being generated in the infrastructure; and

proximity interface configuring means connected to the proximity signalling means, for configuring the proximity signalling means according to at least some of the proximity signalling parameters.

11. A subscriber terminal of a wireless telecommunications system including an infrastructure, the subscriber terminal comprising:
connecting means for connecting the subscriber terminal to the infrastructure;

subscriber identity means for holding a subscriber identity of the subscriber terminal in the wireless telecommunications system;

requesting means connected to the connecting means, for requesting a radio link directed from the infrastructure to at least one sub-terminal, the at least one sub-terminal using the subscriber identity of the subscriber terminal, the radio link being controlled on the basis of signalling parameters;

proximity signalling means for communicating at least one of the signalling parameters with the at least one sub-terminal over a proximity wireless interface; and

signalling means connected to the connecting means and the proximity signalling means, for communicating the at least one of the signalling parameters between the subscriber terminal and the infrastructure.

12. The subscriber terminal of claim 11, further comprising:

second signalling means for communicating proximity signalling parameters between the subscriber terminal and the infrastructure; and

proximity interface configuring means connected to the proximity signalling means and the second signalling means, for configuring the proximity signalling means according to the at least some of the proximity signalling parameters.

13. A sub-terminal of a wireless telecommunications system comprising an infrastructure and a subscriber terminal connected to the infrastructure and holding a subscriber identity in the wireless telecommunications system, the sub-terminal using the subscriber identity of the subscriber terminal and comprising:

receiving means for providing a radio link directed from the infrastructure to the sub-terminal, the radio link being controlled on the basis of

signalling parameters communicated between the subscriber terminal and the infrastructure, the radio link being requested by the subscriber terminal; and

proximity signalling means for communicating at least some of the signalling parameters between the subscriber terminal and the sub-terminal over a proximity wireless interface.

14. The sub-terminal of claim 13, further comprising generating means connected to the proximity signalling means, for generating at some of the signalling parameters.

15. The sub-terminal of claim 13, further comprising sub-terminal signalling means connected to the receiving means, for communicating at least some of the signalling parameters between the sub-terminal and the infrastructure over a wireless interface.

16. The sub-terminal of claim 13, further comprising receiver configuring means connected to the receiving means and the proximity signalling means, for configuring the receiving means according to at least some of the signalling parameters.

17. The sub-terminal of claim 13, further comprising proximity interface configuring means connected to the proximity signalling means, for configuring the proximity signalling means according to at least some of the proximity signalling parameters received from the subscriber terminal.

18. A radio resource control system for controlling radio resources in a wireless telecommunications system including an infrastructure and a subscriber terminal connected to the infrastructure, the subscriber terminal holding the

subscriber identity in the wireless telecommunications system the radio resource control system comprising:

access control means for controlling access of at least one sub-terminal to the infrastructure on the basis of an access request from the subscriber terminal, the at least one sub-terminal using the subscriber identity of the subscriber terminal;

controlling means connected to the access control means, for controlling a radio link directed from the infrastructure to at least one sub-terminal, the radio link being controlled on the basis of signalling parameters; and

signalling means for communicating at least one of the signalling parameters between the infrastructure and the subscriber terminal, the at least one of the signalling parameters being communicated between the subscriber terminal and the at least one sub-terminal over a proximity wireless interface.

19. The radio resource control system of claim 18, further comprising sub-terminal feedback controlling means connected to the signalling means, for controlling the radio link on the basis of the signalling parameters generated in the sub-terminal.

20. The radio resource control system of claim 18, further comprising sub-terminal signalling means connected to the controlling means, for communicating signalling parameters with the at least one sub-terminal over a wireless interface.

21. The radio resource control system of claim 18, further comprising:
proximity wireless interface controlling means for controlling the proximity wireless interface on the basis of proximity signalling parameters; and
second signalling means for communicating at least some of the proximity signalling parameters with the subscriber terminal.